WEB IMPROVEMENT STRATEGY

U.S. Department of Energy October 11, 2011



OBJECTIVE

Improve Digital Communications While Eliminating Wasteful Spending

EXECUTIVE SUMMARY

In June 2011, the Obama Administration launched the Campaign to Cut Waste, an effort to root out wasteful spending at every agency and department in the Federal government, and highlighted Federal Web Reform as a key part of the initiative. Since the Energy Department owns hundreds of websites – about 87 domains and hundreds of subdomains -- we're answering the Administration's call, seizing the opportunity to streamline web operations, reduce duplicative spending and improve overall web communications.

Here's how:

Step One: Identify our Website Footprint.

In order to determine what to reduce, we need to determine what we have and how much it costs. This past spring, we began an aggressive effort to identify all of the websites the Department owns and maintains in order to educate our website reform efforts.

Step Two: Eliminate Wasteful Spending by Consolidating and Reducing Websites.

For the past several months, we've been working on what we call the Energy.gov Renewal Project, the initiative to provide a one-platform solution (i.e. branding, content management system, hosting, etc.) for our public-facing websites. Where possible, we'll be consolidating our headquarter websites into one Energy.gov platform - eliminating duplicative costs on website infrastructure.

Step Three: Establish Clear Governance and Guidance.

In mid-2010, with the support of Secretary Chu and Deputy Secretary Poneman, the Office of Public Affairs launched the New Media Office, to retool the Energy Department's online presence. While New Media is leading the Department's website reform efforts in collaboration with the Office of the Chief Information Officer, web management and new media staff across the Department have established the Energy Web Council to facilitate the sharing of ideas and web best practices, encourage collaboration and resource sharing, and keep us ahead of the curve in this ever-evolving space.

Ultimately, the website reform effort we've launched at the Energy Department aims to save taxpayers more than \$10 million per year. Within the past year alone, we've saved taxpayers over \$1 million by not building some new websites and consolidating others.

However, as digital communications becomes even more central to delivering information and services to the public, the Energy Department will need to make new investments in this area. The process we are undertaking now will put those efforts on a much better footing -- rationalizing our approach, making it more strategic and avoiding costly redundancies and inefficiencies. This more strategic approach will get us more bang for the buck, ensuring the American public gets the information they need, while eliminating wasteful spending none of us can afford.

BACKGROUND

The changing media environment and rapid expansion of high-speed Internet access over the past several years have fundamentally changed the ways that members of the public consume information. This creates new opportunities for the Energy Department to more effectively communicate and increase transparency. As we modernize the Department's approach to new media and digital communications, we can also realize significant opportunities to save money for taxpayers.

Historically, the Energy Department's web presence and new media efforts have been almost entirely decentralized. Our program offices each have maintained their own distinct websites. Not only do these have a different "look and feel," but also in many cases have a different underlying infrastructure to support their individual websites – paying for software (a Content Management System, or CMS) as well as hardware (buying and maintaining servers to host the websites). They also employ a wide range of contractors to maintain and update their websites that modern technologies could eliminate and repurpose. The result is a fragmented and confusing user experience making it hard for the public and our stakeholder audiences to find the information and resources they are seeking – at an unnecessary cost for taxpayers.

In mid-2010, with the support of Secretary Chu and Deputy Secretary Poneman, the Office of Public Affairs launched a New Media Office to retool the Department's overall approach to digital communications to deliver a more effective product while eliminating wasteful spending.

Within its first year our New Media Office gave Energy.gov a facelift and implemented a sustained, strategic and aggressive online outreach strategy using social media tools (Facebook, Twitter, YouTube, etc.) as well as blog content on Energy.gov. Their comprehensive digital strategies expanded the Department's reach from a couple thousand people online to millions.

However, the biggest changes to the Department's online presence are happening as part of the Energy.gov Renewal Project, which is retooling Energy.gov in order to better respond to the growing digital communications demands of the 21st century and reduce wasteful spending.

PROBLEM

The Energy Department's web presence can be described in one word: sprawling. Web surveys facilitated through both DOE and Federal reform efforts showed us that the Department operates several hundred websites on various duplicative, archaic and poor performing technology systems. These systems often

- Are not dynamic or interactive,
- Require manual processes when modern competitors offer automated solutions,
- Cannot communicate with one another (i.e. staff and contractors can spend unnecessary hours updating the same content multiple times in order to share it across multiple websites),
- Require IT professionals to publish content, rather than empowering the communicator/author themselves to publish their own content online and
- Needlessly increase operating costs, when relatively inexpensive, easy-to-use technology alternatives that could better serve our digital communications needs are available.

Simply put – there's a significant opportunity to do a lot more with less by pursuing modern technology solutions and streamlining website infrastructure processes across the Energy Department.

SOLUTION AND IMPLEMENTATION

In order to eliminate wasteful spending and better respond to the growing digital communications demands of the 21st century, the New Media Office within the Office of Public Affairs is spearheading an effort to create a centralized online platform, via Energy.gov, that provides our stakeholder audiences with clear, consistent and reliable information and services wherever and whenever they want it, while also empowering Department employees with simple tools and straightforward guidance to communicate and interact with those stakeholders and each other.

We're calling this effort the Energy.gov Renewal Project. It utilizes open source and cloud computing technologies in order to provide a platform that not only meets current demands, but can also best scale and adapt to future needs at a low cost.

The Energy.gov Renewal Project is making two integral kinds of improvements:

"Front End" cosmetic changes you can see: 1.

In August 2011, a brighter, less cluttered, more strategic Energy.gov was launched making it much easier for public audiences to find the information and services they are seeking. Additional improvements to usability are ongoing as we continue to seek and respond to feedback from stakeholders.

- 2. "Back End" infrastructure changes you can't see:
- Open Source Content Management System

In August 2011, Energy.gov was moved into an open source content management system called "Drupal," which has no monthly licensing fees and is vastly more sophisticated, flexible and user friendly than Energy.gov's previous outdated, proprietary CMS. Non-technical staff members can easily learn how to post press releases, photos or make other routine updates to their websites using the new Drupal CMS. Further, the new Drupal CMS with its sophisticated tagging system will automatically curate web content into relevant web pages exponentially increasing the exposure of web content.

Ь. Cloud Hosting

In support of the OMB 25-point plan, Energy.gov was identified as one of the Energy Department's Cloud First initiatives, and hosting of the Energy.gov infrastructure was moved to the Cloud in August 2011. The Cloud provides the high-availability, scalability and service required for a cabinet-level Department website, and does so at a cheaper cost than internal hosting options.

WEB IMPROVEMENT STRATEGY

The Energy Department's New Media Office is approaching the initiative in three main phases:

- Phase One: Rebuild the front and back-end infrastructure of Energy.gov to make it a top-of-the-line, leading government website. Include the dozen or so program office websites that are wholly dependent upon the current, archaic infrastructure in this upgrade:
- Recovery Act
- Open Gov Ó
- Office of the Chief Information Officer
- Office of Congressional and Intergovernmental Affairs
- Office of Economic Impact and Diversity
- Office of Electricity Deliverability and Energy Reliability
- Office of the General Counsel
- Office of NEPA Policy and Compliance 0
- Office of the Inspector General
- Office of Management
- Office of Policy and Intergovernmental Affairs
- EnergyEmpowers.gov, etc.

Completed August 2011.

- Phase Two: Migrate program office sites that use the 'old' Energy.gov 'look and feel' but have their own back-end infrastructure into the new, cutting-edge infrastructure. This includes offices like
- Office of Energy Efficiency & Renewable Energy, including sites like EnergySavers.gov 0
- Office of Environmental Management
- Office of Fossil Energy
- Office of Nuclear Energy
- Office of Health, Safety and Security
- Office of the Chief Financial Officer, etc.

Expected completion Jan-Feb 2012.

- Phase Three: Work with remaining program offices that have their own various 'look and feels', technology systems, etc. to migrate their sites to the extent possible into the new, cutting-edge infrastructure. This includes offices like
- Office of Science
- ARPA-E
- Loans Program Office
- Office of Legacy Management, etc.

Expected completion Oct-Nov 2012.

ENERGY WEB COUNCIL

The Energy Department Web Managers Council (Energy Web Council) was created in December 2010 as a way for Department Web Managers and New Media Specialists to collaborate across programs, and share common challenges, ideas and best practices. Members work in various program offices and staff offices and include representatives from policy, communications, public affairs, and Chief Information Officer (CIO) staffs.

The purpose of the Energy Department Web Managers Council is to:

- Promote the use of Web best practices on Energy Department websites serving internal and external audiences:
- Address high-level web policy issues that affect all programs;
- Advise and make recommendations to policy-makers, partners and other stakeholders, to improve Energy Department web content and strengthen web content management policies;
- Educate the Energy Department community give them tools to improve web content today, and prepare them to handle the challenges of tomorrow;
- Promote collaboration across programs;
- Provide a way for Energy Department Web Managers and New Media Specialists to share skills, knowledge, best practices, ideas, and solutions;
- Communicate our successes (and challenges) to stakeholders, to bring greater recognition and support for our work and the Energy Department web presence as a whole; and
- Leverage the size and influence of our community to get things done across the Energy Department that would be harder to do individually.

PRELIMINARY SUCCESS

In just a few short months, we've seen tremendous promise with website reform, as evidenced by the new and improved Energy,gov, But we're also seeing some immediate cost benefits. Specifically, by consolidating just one website into Energy.gov this past December, we've been able to nearly cover the initial upfront investment in the new platform. This only gives us further belief in the cost-reduction potential of the project.